## COSYNTH

# GmbH & Co. KG

#### Embedded Systems

CoSynth at embedded world: Hall 12.0, booth 560b

## PR 2/2011

### CoSynth Shows FPGA-based Machine Vision at embedded world



**Oldenburg, February 3rd, 2011** \*\*\* CoSynth GmbH & Co. KG presents exemplary solutions for intelligent camera solutions at embedded world 2011, March 1<sup>st</sup>-3<sup>rd</sup> in Nurnberg. The systems are designed for industrial machine vision and automotive industry. The image manipulation and object recognition core is implemented as a hardware accelerated one-chip FPGA system. Several camera interfaces are supported.

The processing part of the demonstrator has been generated from an existing algorithm written in the C language. The innovative CoSynth

synthesis technology automatically generates the hardware description directly from the software implementation. Development times for the central core of the system are reduced from several weeks of hardware engineering to a few hours of adaption to the surrounding architecture. This way, existing algorithms can be accelerated and prepared for industrial use in embedded systems. Industrial PCs and standard processors can be replaced by energy conserving application-specific processors. Still, the flexibility of the software system is kept through the whole process and in the product.

CoSynth offers its design methodology and tools as part of the following development services and consultancies to the customer:

- Design of FPGA and ASIC systems
  - Hardware acceleration
  - System-on-Chip
  - PCB layout
- Virtual prototyping and co-simulations (SystemC, Matlab/Simulink, VHDL, Verilog)
- Development of embedded software (firmware, RTOS)
- Consulting and training in SystemC, TLM, and ESL design flows

The CoSynth design tools can be evaluated and licensed for in-house use by our customers. CoSynth's software tools integrate into existing design processes without the need of replacing them. They can, e.g.,

be used in conjunction with design tools and FPGAs from Xilinx and Altera. Major markets for the design services and tools are automotive industry, industrial automation, aerospace, and medical technology.

Meet CoSynth at embedded world in Hall 12, booth 56ob and at Hannover Messe in Hall 2, booth A10.

#### About CoSynth

CoSynth is a startup in the area of embedded systems design. The company offers design services and tools for fast and efficient development of electronic solutions at system level. The SystemC and C++ based methods are particularly suitable for the design of mixed hardware/software systems and FPGA based solutions. Hardware accelerations for existing software applications are developed fast and precisely with CoSynth's intersectoral methodology and an own synthesis tool. CoSynth offers software development for embedded systems, too. Further information about services and products can be found at the company's website <a href="http://www.cosynth.com">http://www.cosynth.com</a>.

#### Contact

CoSynth GmbH & Co. KG Christian Stehno, CEO Escherweg 2, 26121 Oldenburg Tel.: +49-441-9722-289 Fax: +49-441-9722-278 <u>stehno@cosynth.com</u> http://www.cosynth.com